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MATERNITY BARN FOR DAIRY COWS

COOPERATIVE FARM BUILDING PLAN EXCHANGE

Plan No. 6146

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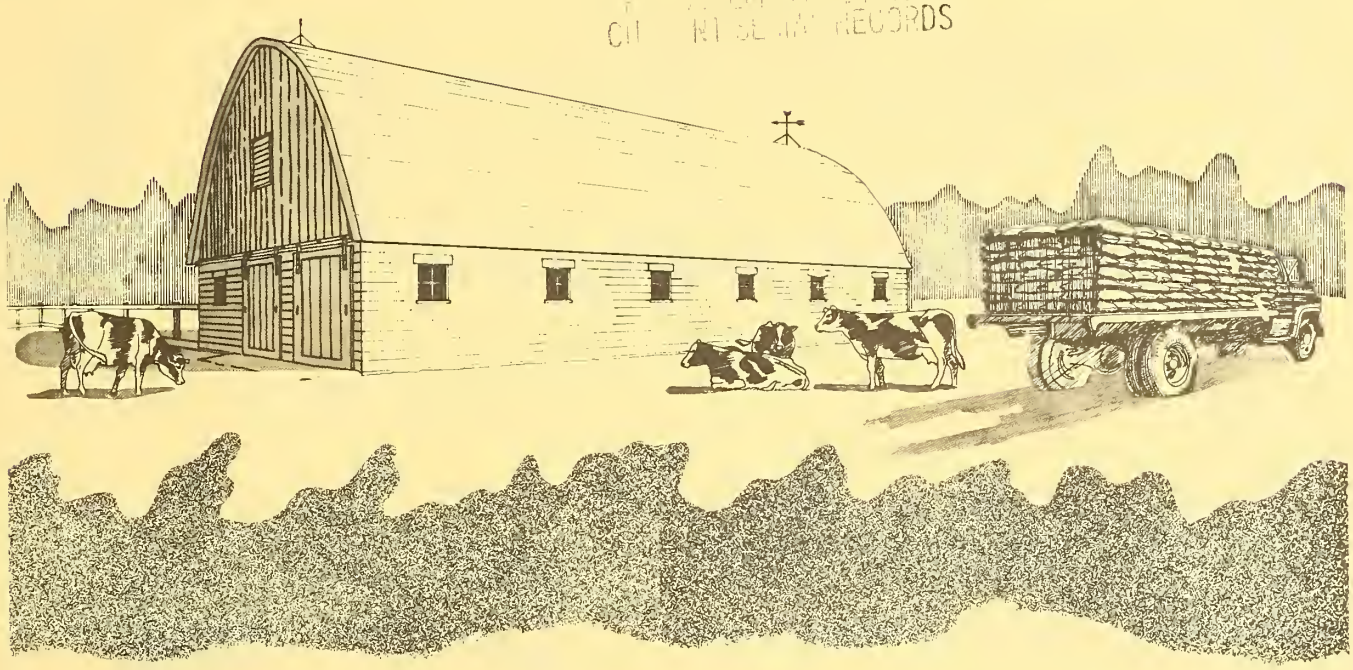

Replacements in your dairy herd are always a problem. You need them—there's no doubt about that. But how you get them is another matter. The easiest way is to raise them yourself, then you know what you're getting. Usually, it's an advantage to raise your own replacements instead of buying them.

This plan was developed by the Pennsylvania State University to provide a maternity barn for dairy cows and to meet a need for design ideas on the housing of dairy calves. Dairy herds are becoming larger and more specialized. Box stalls are not allowed in the milking area in many milk markets. Also, the move to larger free-stall barns has released some obsolete stanchion barns for other purposes.

This plan provides ideas for new, specialized building construction, or for remodeling old barns.

The following are features of the design:

- Pens for maternity.
- Pens for dairy calves after weaning (an alternate to the use of free stalls).
- Elevated tie stalls for baby calves on liquid feed.
- Mechanical cleaning of pens by use of a tractor-manure loader.
- Mechanical cleaning with some manual labor by using a gutter cleaner in a remodeled stanchion barn, because topography may not allow cleanout doors.
- A wall curb to protect divider gates from damage by the tractor loader.
- Straight edges and few corners for efficient tractor cleaning.
- Gate dividers for easy cleaning and for enlarging two or more pens into one large-sized pen if needed.
- Feeding from a straight central alley.
- Parasite control by easy cleaning of the stalls and alleys and separation of manure pack from the feed alleys.
- Possibility of considerable variations in ventilation and auxiliary heat to meet the needs of the management system.

Many dairy farmers have experienced heavy losses in the so-called environmentally controlled housing.

Washington, D.C. Issued August 1975

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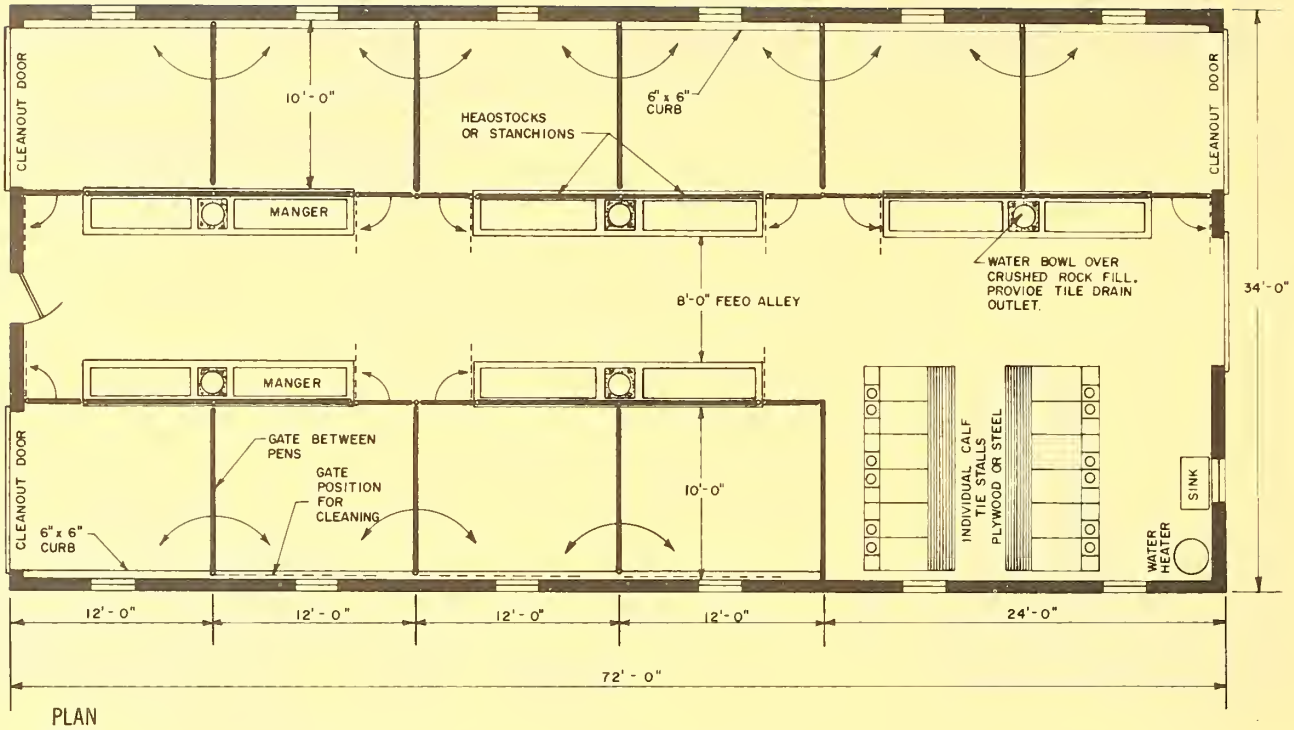
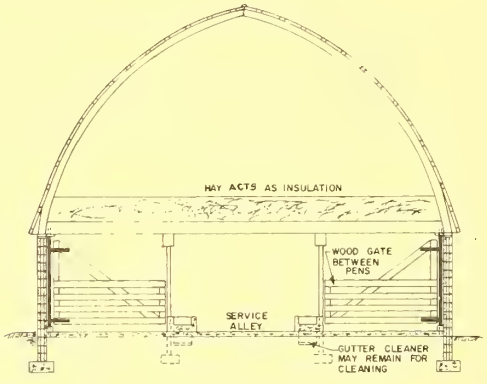


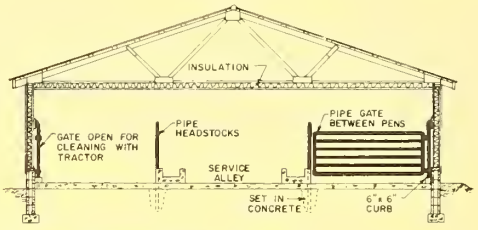
PLAN

For this reason some dairymen are considering this cold-type housing, which will make better use of existing buildings and which will represent a lower investment than building new.

- **Because concrete walls are poor insulation, keep temperatures low in hot weather or add insulation in cold weather.**
- **Ventilates with exhaust fans.**
- **Provides air inlet slot.**
- **Provides end doors for tractor cleaning.**
- **Uses gutter cleaner for semimanual cleaning.**
- **Uses wood or steel gates and headstocks.**



TWO-STORY REMODELED STALL DAIRY BARN



ONE-STORY INSULATED BARN

- **Allows insulation of 3½ inches in walls, up to 6 inches in ceiling.**
- **Ventilates with exhaust fans with or without auxiliary heat.**
- **Uses ceiling slots or plastic tube power inlets.**
- **Provides heat for temperatures above 50° F in winter.**
- **Keeps cold with no insulation by using open eaves and ridge vent, 4 in 12 slope.**

Complete working drawings may be obtained from the extension agricultural engineer at your State university. There may be a small charge to cover cost of printing.

If you do not know the location of your State university, send your request to Agricultural Engineer, Extension Service, U.S. Department of Agriculture, Washington, D.C. 20250. He will forward your request to the correct university.

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AGRICULTURAL RESEARCH SERVICE

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